

In the Claims:

Amend the claims as follows.

1.(currently amended)        An electric discharge machine having an electrode for machining a workpiece ~~in a desirable manner~~ by applying electric discharge machining voltage between an said electrode and said workpiece while feeding said electrode and said workpiece relative to each other to control a machining gap, said electric discharge machine comprising:

      a spindle and an electrode holder for carrying said electrode, said spindle being provided with attachment means for detachably attaching an said electrode holder to said spindle; said electrode holder having an engagement portion for engaging with said attachment means of said spindle, wherein said electrode holder is and provided with an electrode holding means for holding said electrode in said electrode holder;

      an electrode guide holder including an engagement portion for detachably engaging with said electrode holder, said electrode guide holder and having attached thereto an electrode guide for supporting and guiding said electrode; and

      electrode guide holder supporting means for supporting said electrode guide holder for causing said electrode guide holder to selectively disengage from said electrode holder and for moving said electrode guide holder along said electrode to the distal thereof so that said electrode guide attached to said electrode guide holder supports a said distal end of said electrode, said electrode guide holder supporting means having gripping means for gripping said electrode guide holder and being provided with moving means for moving said electrode guide holder ~~in parallel to an axis of said spindle.~~

2.(currently amended)        An electric discharge machine including an electrode for machining a workpiece ~~in a desirable manner~~ by applying electric discharge machining voltage between an a said electrode and said workpiece while feeding said electrode and said

workpiece relative to each other to control a machining gap, said electric discharge machine comprising:

a spindle and an electrode holder, said spindle being provided with attachment means for detachably attaching said electrode or ~~an~~said electrode holder to said spindle;

said electrode holder having an engagement portion for engaging with said spindle attachment means ~~of said spindle~~ and being provided with electrode gripping ~~holding~~ means for ~~holding~~ fixing the position of said electrode in said electrode holder;

an electrode guide for supporting and guiding said electrode held in said electrode holder;

an electrode guide holder adapted to be detachably attached to said electrode holder and having said electrode guide attached thereto, said electrode guide remaining supporting and guiding said electrode after said detachment from electrode holder; and

electrode guide supporting means for supporting said electrode guide, said electrode guide supporting means having gripping means for gripping said electrode guide or said electrode guide holder and provided with moving means for moving said electrode guide or said electrode guide holder in parallel to an axis of said spindle.

3.(original) The electric discharge machine according to claim 1 or 2, wherein said spindle is attached to a spindle head, so that said spindle can be moved in a direction along the axis of said spindle and rotated about the axis of said spindle as well as be positioned at a desired position.

4.(original) The electric discharge machine according to claim 1 or 2, wherein said electrode holder has a flow path formed therein for introducing working fluid into a pipe electrode when said pipe electrode is held therein.

5.(original) The electric discharge machine according to claim 1, wherein said electrode guide holder supporting means is attached to a suitable position on said spindle head or a machine body and has gripping means for gripping said electrode guide holder, so that the electrode guide holder can be gripped by said gripping means to move parallel to the axis of said spindle and positioned at a desired position.

6.(original) The electric discharge machine according to claim 1 or 2, further comprising electrode holder replacement means for transferring said electrode holder between said spindle and an electrode magazine for storing one or more electrode holders.

7.(original) The electric discharge machine according to claim 1 or 2, wherein said electrode guide holder has a tapered-shaped distal end opposed to said workpiece, on which said electrode guide is detachably mounted.

8.(currently amended) The electric discharge machine according to claim 1 or 2, further comprising an anti-vibration guide movable toward and away from a lengthwise middle portion of said electrode mounted on said spindle and capable of holding and guiding said electrode ~~when moving toward said middle portion.~~

9.(currently amended) A method for machining a workpiece ~~in a desirable manner~~ in an electric discharge machine by applying electric discharge machining voltage between an electrode and said workpiece while feeding said electrode and said workpiece relative to each other to control a machining gap, said electric discharge machine comprising a spindle provided with attachment means for detachably attaching an electrode holder to said spindle, said

electrode holder having an engagement portion for engaging with said attachment means of said spindle and provided with electrode holding means for holding said electrode in said electrode holder, an electrode guide holder including an engagement portion for engaging with said electrode holder and having attached thereto an electrode guide for supporting and guiding said electrode, and electrode guide holder supporting means for supporting said electrode guide holder so that said electrode guide supports a distal end of said electrode, said electrode guide holder supporting means having gripping means for gripping said electrode guide holder and provided with moving means for moving said electrode guide holder in parallel to an axis of said spindle,

said method comprising the steps of:

- (a) mounting said electrode guide holder on said electrode holder having an electrode held therein in advance;
- (b) mounting said electrode holder with said mounted electrode guide holder onto said spindle manually or by electrode holder replacement means;
- (c) gripping said electrode guide holder by said electrode guide holder supporting means and moving said electrode guide holder apart from said spindle mounted electrode holder to said distal end of said electrode to support said electrode with said electrode guide; and
- (d) moving said electrode and said workpiece relative to each other to position said electrode at a position on said workpiece to be machined and start the electric discharge machining.

10.(currently amended) A method for machining a workpiece ~~in a desirable manner~~ in an electric discharge machine by applying electric discharge machining voltage between an electrode and said workpiece ~~while feeding said electrode and said workpiece relative to each~~

~~other to control a machining gap, said electric discharge machine comprising having a spindle provided with attachment means for detachably attaching an electrode holder to said spindle, said an electrode holder having an engagement portion for engaging with said attachment means of said spindle and provided with electrode holding means for holding said electrode in said electrode holder, an electrode guide holder including an engagement portion for engaging with said electrode holder and having attached thereto an electrode guide for supporting and guiding said electrode, and electrode guide holder supporting means for supporting said electrode guide holder so that said electrode guide supports a distal end of said electrode, said electrode guide holder supporting means and having gripping means for gripping said electrode guide holder and provided with moving means for moving said electrode guide holder in parallel to an axis of said spindle,~~

said method comprising the steps of:

mounting on said spindle ~~of said electric discharge machine~~ said electrode or said electrode holder having said electrode held therein and said electrode guide holder mounted thereabout;

positioning said electrode guide holder at the distal end of said electrode by inserting said electrode into said electrode guide or by gripping said electrode guide holder ~~gripped by~~ said electrode guide supporting means and moving it away from said electrode holder parallel to the axes of said electrode and said spindle so that a distal end of said electrode is supported by said electrode guide;

moving said electrode and said workpiece relative to each other to position said electrode at a position on said workpiece to be machined; and

applying electric discharge machining voltage between said electrode and said workpiece while feeding said electrode and said workpiece relative to each other to carry out the electric discharge machining on said workpiece.

11.(currently amended) A method for machining a workpiece ~~in a desirable manner~~ in an electric discharge machine ~~by applying electric discharge machining voltage between an electrode and said workpiece while feeding said electrode and said workpiece relative to each other to control a machining gap~~, said electric discharge machine comprising: having an electrode, a spindle provided with an attachment member ~~means for detachably attaching an electrode holder to said spindle~~, said an electrode holder having an engagement portion ~~for engaging with said attachment means of said spindle and provided with electrode holding means for holding said electrode in said electrode holder~~, an electrode guide holder having ~~including~~ an engagement portion ~~for engaging with said electrode holder and having attached thereto~~ an electrode guide for supporting and guiding said electrode, electrode guide holder supporting means for supporting said electrode guide holder ~~so that said electrode guide supports a distal end of said electrode~~, ~~said electrode guide holder supporting means~~ and having gripping means for gripping said electrode guide holder, being also and provided with moving means for moving said electrode guide holder ~~in parallel to an axis of said spindle~~, and electrode holder replacement means for transferring said electrode holder with an electrode held thereby ~~between said spindle and an electrode magazine for storing one or more electrode holders~~,

said method comprising the steps of:

holding said electrode in said electrode holder;

mounting said electrode guide holder on said electrode holder so that said electrode is inserted into said electrode guide of said electrode guide holder;

accommodating said electrode holder in said electrode magazine ~~of said electric discharge machine~~;

taking out said electrode holder from said electrode magazine by said electrode holder replacement means and mounting said electrode holder with said electrode and said electrode guide holder onto said spindle ~~of said electric discharge machine~~;

releasing the mounting of said electrode guide holder on said electrode holder and moving said electrode guide holder parallel to an axis of said spindle by said electrode guide holder supporting means so that said distal end of said electrode is supported by said electrode guide;

moving said electrode and said workpiece relative to each other to position said electrode at a position on said workpiece to be machined; and

applying electric discharge machining voltage between said electrode and said workpiece while feeding said electrode and said workpiece relative to each other to carry out the electric discharge machining on said workpiece.